



DEPARTMENT OF THE ARMY
OFFICE OF THE ASSISTANT SECRETARY
RESEARCH DEVELOPMENT AND ACQUISITION
103 ARMY PENTAGON
WASHINGTON DC 20310-0103



REPLY TO
ATTENTION OF

22 SEP 1996

SAIS-ADM

Paul
MEMORANDUM FOR UNDER SECRETARY OF DEFENSE FOR ACQUISITION AND
TECHNOLOGY

SUBJECT: Open Systems Acquisition of Weapons Systems

References:

- a. Memorandum, USD(A&T), dated November 29, 1994, subject: Acquisition of Weapons Systems Electronics Using Open Systems Specifications and Standards.
- b. Memorandum, USD(A&T), dated July 10, 1996, subject: Open Systems Acquisition of Weapons Systems.
- c. Memorandum, USD(A&T), dated August 6, 1996, subject: Open Systems Acquisition of Weapons Systems and the Defense Information Infrastructure (DII).
- d. Memorandum, OSD, dated August 22, 1996, subject: Implementation of the DoD Joint Technical Architecture.

Our open systems approach, as requested by reference b, is demonstrated in the Army Enterprise Architecture: Technical, System, and Operational components. Army intends to provide its response by November 1996 via the Joint Technical Architecture (JTA) initiative (reference d). With the concept of "one vision" (Fig.1), the Army plans an integrated approach to open standards for all Army systems. Army systems designers, developers, producers and implementors are aware of the senior Army leadership's drive via the Enterprise Architectures. The Army also continues its participation in several OSD-level initiatives, such as the Open Systems Joint Task Force (OS-JTF), JTA, High Level Architecture (HLA), and Technical Architecture Framework for Information Management (TAFIM) which all appear to pursue the same objective: full seamless interoperability. Recommend OSD also consider this "one vision" approach via the JTA.

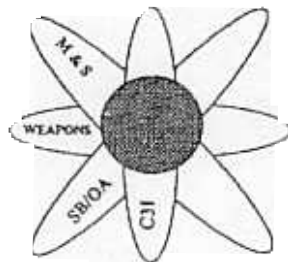
The Army Technical Architecture (ATA) has been mandated for all Army systems. The Army Systems and Operational Architectures are also under development to complete our full plan to implement an open systems approach for weapon systems as well as non-weapon systems. We have defined the Enterprise Architectures as the mechanism for achieving interoperability via an open systems approach. The Army



intends to achieve interoperability and reduce costs through a single technical architecture that mandates a core set of common standards yet recognizes and accommodates the unique requirements of individual functional domains. The requirement to begin migration to the ATA was effective as of version 3.1 (March 1995) with full compliance required by 2006. The Vice Chief of Staff, Army and I mandated that all systems developers must address compliance to the ATA via a migration plan. Compliance with ATA standards will be included as an evaluated requirement in all acquisitions. All migration plans must identify program cost, schedule and performance impacts in complying with the ATA.

Figure 1

Army Technical Architecture



Although original versions of the ATA were primarily applicable to automated information systems, it is recognized that in order to digitize the battlefield and achieve interoperability, embedded real time and weapon systems must be included. The Army established a Weapon Systems Technical Architecture Working Group (WSTAWG) to identify specific requirements and standards peculiar to weapon systems. The work of the WSTAWG will ensure that weapon systems are part of the Enterprise Vision. As of ATA version 4.0 (January 1996), weapon systems requirements are identified. All new system acquisitions must include requirements contractually obligating vendors to comply with these commercial and government standards. Our WSTAWG is producing horizontal requirements for weapon systems which would be delivered at a quicker pace with financial support from QSD to facilitate achieving the department's Joint Vision 2010. The Army proposes that our WSTAWG provide the core foundation for a weapon systems open standards approach and become the weapon systems extension to the JTA.

DISC4 points of contact are COL William Teter, 703-697-4790, and Mrs. Adele McCullough-Graham, 703-695-1672.

*Paul: We are
serious about
mandating open
architecture. I really
believe you should
force it. => above
Jul*

Gilbert F. Decker
Assistant Secretary of the Army
(Research, Development and Acquisition)